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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/538,578	06/15/2005	Xavier Pruvost	FR 020141	9002
24737 759	90 12/18/2006		EXAMINER	
•	ELLECTUAL PROPER	HU, RUI MENG		
P.O. BOX 3001 BRIARCLIFF MANOR, NY 10510			ART UNIT	PAPER NUMBER
2.0			2618	
		•	DATE MAILED: 12/19/2004	

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)				
	10/538,578	PRUVOST ET AL.				
Office Action Summary	Examiner	Art Unit				
	RuiMeng Hu	2618				
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet w	vith the correspondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA  - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period w  - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUN 16(a). In no event, however, may a rill apply and will expire SIX (6) MC cause the application to become A	ICATION. reply be timely filed  NTHS from the mailing date of this communication. BANDONED (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 15 Ju	ne 2005.					
·	· · · · · · · · · · · · · · · · · · ·					
3) Since this application is in condition for allowan	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims						
4)⊠ Claim(s) <u>1-6</u> is/are pending in the application.						
4a) Of the above claim(s) is/are withdrawn from consideration.						
5) Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>1-4</u> is/are rejected.						
• • • • • • • • • • • • • • • • • • • •	7)⊠ Claim(s) <u>5 and 6</u> is/are objected to.					
8) Claim(s) are subject to restriction and/or	election requirement.					
Application Papers						
9)☐ The specification is objected to by the Examiner.						
10)⊠ The drawing(s) filed on <u>06/15/2005</u> is/are: a)□ accepted or b)⊠ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.						
Priority under 35 U.S.C. § 119						
12)⊠ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).						
a)⊠ All b)□ Some * c)□ None of:  1.⊠ Certified copies of the priority documents have been received.						
<ul> <li>1. ✓ Certified copies of the priority documents have been received.</li> <li>2. ☐ Certified copies of the priority documents have been received in Application No</li> </ul>						
3. Copies of the certified copies of the priority documents have been received in Application No						
application from the International Bureau (PCT Rule 17.2(a)).						
* See the attached detailed Office action for a list of the certified copies not received.						
	·					
Attachment(s)						
1) Notice of References Cited (PTO-892)		Summary (PTO-413)				
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08)		(s)/Mail Date Informal Patent Application				
Paper No(s)/Mail Date <u>08/29/2006</u> .	6)  Other: _					

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## **DETAILED ACTION**

### **Priority**

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

#### Information Disclosure Statement

2. The information disclosure statement (IDS) submitted on 08/29/2006 has been considered by the examiner and made of record in the application file.

## **Drawings**

3. Figure 1 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). Corrected drawings in compliance with 37 CFR 1.121(d) are required in reply to the Office action.

# Claim Objections

4. Claims 5 and 6 are objected to under 37 CFR 1.75(c) as being in improper form because a multiple dependent claim cannot depend from any other multiple dependent claim. See MPEP § 608.01(n). Accordingly, the claims have not been further treated on the merits.

# Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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6. Claims 1-3 are rejected under 35 U.S.C. 102(b) as being anticipated by Raynaud et al. (US Patent 5430410).

Consider **claim 1**, Raynaud et al. clearly disclose a regulating system for regulating, with respect to a reference level (*figure 1*, *Vref*), the level of an amplified signal (*figure 4*, *means 11*, *column 3 lines 49-53*), said regulating system comprising: attenuation means (*figure 1*, *means 12*) for generating an attenuated signal (*figure 1*, *output of means 12*) from said amplified signal according to a programmable attenuation factor (*column 2*, *lines 4-7*, *column 3 lines 30-32*, *38-48*, *60-64*), conversion means (*figure 1*, *diode detector 15*, *column 4 lines 5-10*) for converting said attenuated signal in order to generate an output signal (*figure 1*, *Vd*) intended to be compared with said reference level (*Vref*).

Consider claim 2, as applied to claim 1 above, Raynaud et al. clearly disclose said attenuation means (*figure 1, means 12*) comprise a network of resistances defined by a set of .pi.-structures connected in series, each node of the .pi.-structures being connected to a switch intended to be activated for defining said programmable attenuation factor (*figure 1, attenuators 13n, column 2, lines 4-7, column 3 lines 30-32, 38-48, 60-64, digital attenuators 13n are controlled digitally (switched on or off), achieving same dynamic attenuation results), said conversion means (<i>figure 1, diode detector 15*) comprise processing means for generating said output signal with a level proportional to the square of the effective value of said attenuated signal (*figure 1, column 4 lines 5-10, diode detector 15 converts attenuated signal into a suitable voltage value Vd as an input of operational amplifier 16 for comparing purpose).* 

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Consider claim 3, as applied to claim 2 above, Raynaud et al. clearly disclose the switches are intended to be activated by a command word delivered by a digital bus (figure 1, control means 17) (figure 1, attenuators 13n, column 2, lines 4-7, column 3 lines 30-32, 38-48, 60-64, digital attenuators 13n are controlled digitally (switched on or off)).

## Claim Rejections - 35 USC § 103

- 7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 8. The factual inquiries set forth in *Graham* v. *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:
  - 1. Determining the scope and contents of the prior art.
  - 2. Ascertaining the differences between the prior art and the claims at issue.
  - 3. Resolving the level of ordinary skill in the pertinent art.
  - 4. Considering objective evidence present in the application indicating obviousness or nonobviousness.
- 9. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to

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consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

10. Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Raynaud et al. (US Patent 5430410) in view of Kovacs et al. (US Patent 5422601).

Consider claim 4 as applied to one of claims 1 to 3, Raynaud et al. fail to disclose a voltage comparator including an adjustable voltage/current converter, for generating an output current signal I.sub.AGC being proportional to the difference between said output signal and said reference level.

In the same field of endeavor, Kovacs et al. clearly disclose a voltage comparator (figure 2, level comparator 42, column 3 lines 47-66) including an adjustable voltage/current converter (figure 2, Voltage to Current Converter 44, Gain Switch Input Circuit 54), for generating an output current signal I.sub.AGC (figure 2, gain control input of VGA 12) being proportional to the difference between said output signal (figure 2, output of 40) and said reference level (figure 2, output of 52).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate the selection technique taught by Kovacs et al. into the art of Raynaud et al. as to include an adjustable voltage to current converter for providing dynamic control over signal amplification.

#### Conclusion

11. Any response to this Office Action should be faxed to (571) 273-8300 or mailed

to: Commissioner for Patents P.O. Box 1450

Alexandria, VA 22313-1450

Hand-delivered responses should be brought to

Customer Service Window Randolph Building 401 Dulany Street Alexandria, VA 22314

12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to RuiMeng Hu whose telephone number is 571-270-1105. The examiner can normally be reached on Monday - Thursday, 8:00 a.m. - 5:00 p.m., EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edan Orgad can be reached on 571-272-7884. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

RuiMeng Hu R.H./rh November 30, 2006

EDAN ORGAD
PATENT EXAMINER/TELECOMM.

12/4/56